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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/073,488	02/11/2002	George Jyh-Shann Chou	17714 (MHM 13417US01) 6030	
Tyco Electronics Corporation 307 Constitution Drive MS R20/2B Menlo Park, CA 94025			EXAMINER WYSZOMIERSKI, GEORGE P	
			ART UNIT	PAPER NUMBER
			1742	
			DATE MAILED: 06/09/2003	

Please find below and/or attached an Office communication concerning this application or proceeding.

		\$_9			
	Application No.	Applicant(s)			
Office Action Summany	10/073,488	CIOCIRLAN ET AL.			
Office Action Summary	Examiner	Art Unit			
The MAII INC DATE of this communication con	George P Wyszomierski	1742			
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address			
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, - Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). Status	side(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) day ill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).			
1) Responsive to communication(s) filed on	_·				
2a)☐ This action is FINAL . 2b)⊠ Thi	s action is non-final.				
3) Since this application is in condition for allowa closed in accordance with the practice under <i>l</i> Disposition of Claims					
4)⊠ Claim(s) <u>1-28</u> is/are pending in the application					
4a) Of the above claim(s) <u>19-28</u> is/are withdrawn from consideration.5) ☐ Claim(s) is/are allowed.					
5)					
7)⊠ Claim(s) <u>4-12,14,15,17 and 18</u> is/are objected to.					
8) Claim(s) are subject to restriction and/or					
Application Papers	o.oo.on.oo.oo.oo.oo.oo				
9) The specification is objected to by the Examiner	·.				
10)⊠ The drawing(s) filed on 20 December 2002 is/ar	e: a)⊠ accepted or b)⊡ objected t	o by the Examiner.			
Applicant may not request that any objection to the	e drawing(s) be held in abeyance. S	ee 37 CFR 1.85(a).			
11)☐ The proposed drawing correction filed on	is: a)□ approved b)□ disappro	ved by the Examiner.			
If approved, corrected drawings are required in reply to this Office action.					
12) The oath or declaration is objected to by the Examiner.					
Priority under 35 U.S.C. §§ 119 and 120					
13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).					
a) ☐ All b) ☐ Some * c) ☐ None of:					
 Certified copies of the priority documents 	s have been received.				
2. Certified copies of the priority documents have been received in Application No					
 3. Copies of the certified copies of the prior application from the International Bur * See the attached detailed Office action for a list of the certified copies of the prior application. 	eau (PCT Rule 17.2(a)).	-			
14)☐ Acknowledgment is made of a claim for domestic	priority under 35 U.S.C. § 119(e	e) (to a provisional application).			
a) The translation of the foreign language pro-					
Attachment(s)					
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2.	5) Notice of Informal F	r (PTO-413) Paper No(s) Patent Application (PTO-152)			
S. Patent and Trademark Office					



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- 1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
 - I. Claims 1-18, drawn to a process, classified in class 148, subclass 526.
 - II. Claims 19-28, drawn to an apparatus, classified in class 219, subclass647.
- 2. The inventions are distinct, each from the other because:

Inventions I and II are related as process and apparatus for its practice. The inventions are distinct if it can be shown that either: (1) the process as claimed can be practiced by another materially different apparatus or by hand, or (2) the apparatus as claimed can be used to practice another and materially different process. (MPEP § 806.05(e)). In this case the apparatus as claimed can be used to practice a materially different process, such as a process which involves melting by using heat generated by the induction coil of Invention II.

Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their different classification and recognized divergent subject matter, restriction for examination purposes as indicated is proper.

3. During a telephone conversation with Dean Small, attorney of record, on May 29, 2003 a provisional election was made with oral traverse to prosecute the invention of Group I, claims 1-18. Affirmation of this election must be made by applicant in replying to this Office action. Claims 19-28 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.



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- 4. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).
- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 6. Claims 1, 2, and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chen et al. (PG Publication 2001/0009724) in view of any of Hogg (U.S. Patent 4,390,377), Arnaud et al. (U.S. Patent 6,093,267), or JP 11-289645.

Chen et al. discloses a process which includes coating one or a plurality of conductive wires with a metallic coating, preferably by electroplating (see Chen paragraph [0052]), followed by heat treating of the coated product in order to relieve stress and improve the mechanical properties of the product. The Chen products are to be used as conductive contacts in electronic applications.

Chen does not disclose induction heating as a method of heat treatment. Each of the secondary references indicates that it is well-known in the art to heat treat coated wires by an induction heating process; see Hogg column 8, lines 25-30, Arnaud example 3, or the Abstract

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of JP '645. The Hogg and Arnaud patents state that one purpose of the heat treatment is to relieve stress in the coated wires.

Based upon these disclosures of Hogg, Arnaud, or JP '645, it would have been an obvious expedient to one of ordinary skill in the art to employ induction heating as the heat treatment step in the Chen et al. process.

7. Claims 3 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chen et al. in view of Hogg, Arnaud et al., or JP 11-289645, as set forth above, or over this combination of references and further in view of Evans (U.S. Patent 5,350,467).

The prior art as set forth in the preceding section does not disclose heating different portions of the heat treated materials by different amounts, as required by the instant claims. The examiner's position is that:

- a) Such a feature would be inherent in any practical heat treatment process such as those of Chen, Hogg, Arnaud, or JP '645, i.e. inevitably some portion of the treated product will be closer to the heating source than other portions and therefore the two portions will be heated by different amounts, and
- b) The Evans patent indicates it to be conventional in the art to perform an induction heat treatment process in such a manner that one differentially heat treats different portions of the objects being heated.

Therefore, the features as presently claimed would either be inherent in the process of Chen combined with that of Hogg, Amaud, or JP '645, or would be considered well-known by one of ordinary skill in the induction heat treating art, as evidenced by Evans.

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- 8. Claims 4-12, 14, 15, 17 and 18 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- 9. The remainder of the art cited on the enclosed PTO-892 and 1449 forms is of interest. This art is held to be no more relevant to the claimed invention than the art as applied in the rejections, supra.
- 10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to George Wyszomierski whose telephone number is (703) 308-2531. The examiner can normally be reached on Monday thru Friday from 8:00 a.m. to 4:30 p.m. Eastern time.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Roy King, can be reached on (703) 308-1146. The fax phone number for this Group is (703) 872-9310 for all correspondence except for After Final amendments in which case the Fax number is (703) 872-9311. The Right fax number for this examiner is (703) 872-9039. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0661.

GEORGE WYSZOMIERSKI PRIMARY EXAMINER

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